

ABSTRACT



SKRIPSI, OKTOBER 2019

Ridho Rizki Ananda

Study S1 Fisioterapi

Fakultas Fisioterapi

Universitas Esa Unggul

THE INFLUENCE OF *STRENGTHENING EXERCISE* ON THE STRENGTH OF *QUADRICEP* MUSCLE IN *OSTEOARTHRITIS* PATIENTS RSUD M.Natsir Solok

consists of VI Bab, 53 pages, 12 tables, 8 pictures, 3 schemes, 7 attachment. the aim: to determine the effect of strengthening exercise on *quadricep muscle strengthening* in patients with knee *osteoarthritis* in RSUD M.natsir Solok. Method: this research is quasi experimental with research design in the form of *pre post test control group design*, where *osteoarthritis* were measured by the WOMAC scale and *quadricep* muscle strength of the patients was measured by MMT. The sample consisted of 24 patients. Results: normality test with the *Sphiro Wilk test*, where the data were not normally distributed, and homogeneity test to find out homogenous data. Hypothesis 1 using *Paired Sample test* the result obtained p value 0.039, hypothesis 2 using *Paired Sample test* the result obtained 0,000, and hypothesis 3 using *Independent Sample test* and get result for group treatment p value 0,001 and the control group gets results p value 0,001 which means that there is an effect of giving *strengthening exercise* on *quadriceps muscle strengthening*. Conclusion: There is an effect of giving *strengthening exercise* on *quadricep* muscle strengthening in patients with knee *osteoarthritis*.

Key point: strengthening, quadricep, osteoarthritis